

Ultra precise temperature control for non-linear crystals
Stability < 1/100 °C
Digital settable PID regulator
PT100 3-wire sensor
USB interface



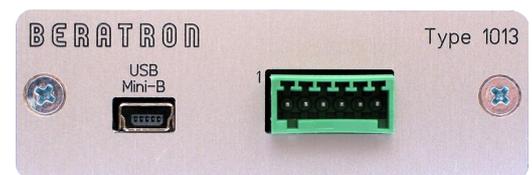
The crystal oven controller type 1013 is designed to control non-linear crystal (NLO) for e.g. second harmonic generation (SHG) or third harmonic generation (THG) with a very high stability.

The oven controller drives heating resistors up to 20V / 2 Amps. It controls the temperature with a three-wire PT100. A settable, digital PID regulator enables the operator to use and to adapt to different loads. To easily set up the regulator all measured temperatures can be sent to the computer via USB interface.

The oven controller is supplied with 24 V/DC and equipped with a USB interface to set up all relevant operation parameters. All parameters are stored in a non-volatile memory.

A configurable relay output (open / close) indicates that the desired temperature is reached.

The oven controller operates also without USB connection based on the internally stored values. Two pins have to be connected (e.g. by the main control of the laser or simply shortened) to switch on the heating process.



Picture 1: Top view

Supply	24 V/DC
Output	max. 20 V / 2 Amps (configurable)
USB Interface	Mini - B
external On / Off	close loop
Relay output	24 V / 400 mA
PT 100 input	3-wire interface
PID parameter	configurable via USB interface
Stability	< 1 / 100 °C
Dimension	105 x 72 x 25 mm ³
Weigth	Module 160 g without connectors